



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
[www.uspto.gov](http://www.uspto.gov)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/600,047	06/19/2003	Louis A. Lippincott	884.898US1	6017
7590 Louis A. Lippincott 720 Anderson Drive Los Altos, CA 94024	05/21/2007		EXAMINER DANG, DUY M	
			ART UNIT 2624	PAPER NUMBER
			MAIL DATE 05/21/2007	DELIVERY MODE PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/600,047	LIPPINCOTT, LOUIS A.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Duy M. Dang	2624	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 07 March 2007.
- 2a) This action is FINAL.                    2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 1-9 and 19-30 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) Claim(s) \_\_\_\_\_ is/are allowed.
- 6) Claim(s) 1-9 and 19-30 is/are rejected.
- 7) Claim(s) \_\_\_\_\_ is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
  - a) All    b) Some \* c) None of:
    1. Certified copies of the priority documents have been received.
    2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
    3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | Paper No(s)/Mail Date. _____                                      |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>11/17/06+12/5/05+4/13/05</u> . | 5) <input type="checkbox"/> Notice of Informal Patent Application |
|   | 6) <input type="checkbox"/> Other: _____.                         |

## **DETAILED ACTION**

### ***Election/Restrictions***

1. Applicant's election without traverse of Invention of Group I, claims 1-9 and 19-30, in the reply filed on 2/21/07 is acknowledged.

### ***Response to Amendment***

2. Applicant's amendment filed on 2/21/07 has been entered and made of record. Currently claims 1-9 and 19-30 are pending.

### ***Specification***

3. The lengthy specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the specification.

### ***Claim Rejections - 35 USC § 101***

4. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

5. Claim 25-30 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

In this case, claims 25-30 are directed to a machine readable medium which is defined as either (i)statutory subject matter as specified at page 4 lines 3-9 of the specification ("a machine-readable medium...flash memory devices, etc.") or (ii)non-statutory subject mater as specified at page 4 lines 9-11 of the specification ("as well as...carrier waves, infrared signals...signal, etc."). Applicant is advised to amend the specification (i.e., remove or delete such non-statutory subject

matter) and/or claims (i.e., includes “a machine-readable storage medium” or “a machine-readable memory”) to exclude such non-statutory in order to satisfy the requirement of 101.

***Claim Rejections - 35 USC § 102***

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

7. Claims 1-9 and 19-30 are rejected under 35 U.S.C. 102(b) as being anticipated by Li (EP 0257581A2, referred as Li hereinafter).

Regarding claim 1, Li teaches an apparatus (i.e., array of MxM processing element PEs depicted at figure 1 and each PE comprising arithmetic and logical unit ALU 6 as depicted in figure 1 as well) comprising: a first processor that includes a first processor element (i.e., PE at (0,0) of figure 1); and a second processor that includes a second processor element (i.e., PE at (0,2) of figure 1), wherein the first processor is configured to transmit data to the second processor through a third processor (i.e., PE at (0,1) of figure 1. Note this PE refers to claimed “third processor” in together with the function of each PE described at page 6 lines 54-55), wherein no processor element within the third processor is configured to perform a process operation on the data as part of the transmission of the data from the first processor to the second processor (see connection control mechanism CCM 8 of figure 8 and described at page 5 lines 26-32).

The advanced statements as applied to claim 1 above are incorporated herein. Li further teaches: wherein the first processor is not directly connected with the second processor (i.e., PE

Art Unit: 2624

at (0,0) is not directed connected with the second PE at (0,2) according to figure 1) as required by claim 2; wherein no processor element within the third processor is involved in the transmission of data from the first processor to the second processor through the third processor (i.e., the PE at (0,1) of figure 1 corresponds to the so-called “third processor”) as required by claim 3; wherein the first processor, the second processor and the third processor are coupled together in a point-to-point configuration as required by claim 4 (i.e., PE at (0,2) and PE at (0,1) are coupled in the point-to-point configuration as shown in figure 1); hardware accelerator (see memory 7 of figure 1 and registers 37 and 37 of figure 3. This interpretation is consistent with applicant’s disclosed paragraph [0045]) as required by claim 7; expansion interface (i.e., host computer 3 and bus 9 as shown in figure 1) as required by claim 8.

Regarding claims 5, 9, 19-28, the rejection of claims 1-4 and 7-8 above are incorporated herein.

***Conclusion***

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Duy M. Dang whose telephone number is 571-272-7389. The examiner can normally be reached on Monday to Friday from 6:00AM to 2:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner’s supervisor, Eileen D. Lillis can be reached on 571-272-6928. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2624

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

dmd

5/07



DUY M. DANG  
PRIMARY EXAMINER